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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/437,694	11/10/1999	KENICHI NAGAWASA	B208-346 DIV	8328

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EXAMINER	
NGUYEN, HUY THANH	
ART UNIT	**PAPER NUMBER**
2615	31

DATE MAILED: 04/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 09/437,694	Applicant(s) NAGAWASA ET AL.	
	Examiner HUY T NGUYEN	Art Unit 2615	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *12 February 2004*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *38-43* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *38-43* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. §§ 119 and 120

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

13)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

a) ☐ The translation of the foreign language provisional application has been received.

14)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) *31* .
4) ☐ Interview Summary (PTO-413) Paper No(s). _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: .

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the first paragraph of 35 U.S.C. 112:

> The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

2. Claims 38-43 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

The specification does not describe an first encoder for encoding a first digital information and output parallel data of L bits and first converting for converting into parallel data of L bits into the first parallel data of N bits and an error correcting unit for adding the error correcting coded into the first parallel data as being recited in claims 38- 43. It is noted that the specification teaches only the MUSE signal is processed into parallel data . See Fig. 12.

Applicant ague that a slash line data indicating parallel data . In response the examiner disagrees since the applicant argument is inconsistent with various embodiments disclosed in the specification . In the embodiment of Fig. 2 , the luminance data conveyed by a slashed line but never specified that the luminance data is parallel data . In embodiment fig. 12 only MUSE signal is specified as

parallel data and that is the feature defining the difference between fig. 2 and fig. 12.

See description in the specification of Fig. 2 and Fig. 12 below

FIG. 2 is a block diagram showing the arrangement of a digital VTR arranged as the embodiment of this invention. Referring to FIG. 2, a terminal 2 is arranged to input the luminance signal Y of a baseband signal. Terminals 4 and 6 are arranged to input a color-difference signal Pb and a color-difference signal Pr respectively. A terminal 8 is arranged to input an audio signal which comes along with the baseband signal. A terminal 9 is arranged to input a MUSE signal.

(4) Recording a Baseband Signal

(5) The baseband signal is recorded in the following manner.

(6) A terminal 34 receives a mode signal MODE which designates either a baseband signal recording mode or a MUSE signal recording mode. In recording the baseband signal, the signal MODE causes switches 10 and 36 to have their connecting positions at their terminals B. Then, the luminance signal Y is allowed to be supplied via the switch 10 to an analog-to-digital (A/D) converter 12. The signal Y is converted by the A/D converter 12 into a digital signal of eight bits.

(7) Assuming that the sampling frequency fs of the A/D converter 12 is 44.55 MHz, the number of effective picture elements per line is 1,152. The bit rate then becomes 356.4 Mbps. Such a high bit rate does not allow the VTR to perform recording over a long period of time. Besides, the data processing speed of the VTR becomes too fast. Therefore, the digital luminance signal output from the A/D converter 12 is supplied to a band compressor 14 to have its frequency band compressed there. A sub-sampling circuit or a known high-efficiency encoding circuit or the like is usable as the band compressor 14. In the case of this embodiment, the number of picture elements is reduced to 1/2 by sub-sampling. Further, the 8-bit signal is reduced to a 4-bit signal by a differential pulse code modulation (hereinafter referred to as DPCM). The amount of information is thus reduced to 1/4.

(8) The luminance signal data which is band-compressed by the compressor 14 is supplied to a memory circuit 16 which functions as a bit converter and a buffer. The memory circuit 16 then performs a process of converting two 4-bit data into one 8-bit data and also performs a timing adjustment process on a chrominance signal and an audio signal to adjust them to each other as will be described later. As a result, the luminance signal output from the circuit 16 has 288 symbols per line.

FIG. 12 shows the recording system of a digital VTR which is arranged as the third embodiment of this invention. In FIG. 12, the same component parts as those of FIG. 2 are indicated by the same reference numerals. The following description covers only a point in which the third embodiment differs from the first embodiment which is shown in FIG. 2.

(57) In the case of the third embodiment, the MUSE signal is compressed after it is digitized. This operation is as follows: an 8-bit digital MUSE signal which is obtained from an A/D converter 12 is supplied to a band compressor 15 to be converted into 6-bit parallel data through a DPCM process. As mentioned in the foregoing, the audio signal included in the MUSE signal is originally in the form of analog three-valued signal. In this instance, therefore, the conversion of it from the 8-bit signal into the 6-bit signal by the DPCM process does not cause any deterioration of information at all. The digital MUSE signal thus obtained has 360 symbols per line. The 6-bit digital signal is supplied to a conversion circuit 17. The conversion circuit 17 then converts it into 8-bit parallel data by converting four symbols of six bits into three symbols of eight bits. The output of the conversion circuit 17 is supplied to the terminal M of a data selector 36.

Conclusion

3. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Kageyama et al teaches a apparatus having a prcessing means for processing digital data wherein a slashed line describing serial data (Fig 5) .

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any

extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to HUY T NGUYEN whose telephone number is (703) 305-4775. The examiner can normally be reached on 8:30AM -6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew Christensen can be reached on (703) 308-9644. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

H.N

HUY NGUYEN
PRIMARY EXAMINER